

## AMPHIBIOUS MANOEUVRE OPERATIONS

*A self-contained and sea based amphibious force is the best kind of fire extinguisher because of its flexibility, reliability, logistic simplicity and relative economy.*

Sir Basil Liddell Hart<sup>1</sup>

The Australian tradition of amphibious operations began with the capture of German New Guinea in September 1914 and the unsuccessful Gallipoli campaign of 1915. During World War II, Australian and American forces conducted a series of amphibious landings in New Guinea, New Britain, the Philippines and Borneo. Unfortunately this hard-won expertise was not maintained, and from the mid-1950s the focus on Cold War anti-submarine operations, counter-insurgency and continental defence led to severe reductions in amphibious capabilities. A vestigial amphibious capability was retained throughout the period but not until the late 1960s did the Vietnam experience convince the government that the Australian Defence Force (ADF) again required specialised amphibious vessels operated by the Royal Australian Navy (RAN).

Six *Balikpapan* class heavy landing craft (LCH) entered service from 1971, and a decade later the heavy landing ship (LSH) HMAS *Tobruk* and the training ship HMAS *Jervis Bay* (I) added some military sealift capability. These ships did not operate together as a cohesive amphibious force, however. Operation MORRIS DANCE, the ADF's response to the 1987 Fiji crisis, revealed the government's limited power projection response options, and the lessons learnt became a clarion call for a return to a credible capability in maritime manoeuvre and amphibiousity. The acquisition in 1994 of two *Newport* class tank landing ships (LST), HMA Ships *Manoora* and *Kanimbla*, was an important step forward, but the vessels required extensive refit and modification into amphibious transports (LPA) and were not ready in time for East Timor operations in 1999. Instead, the RAN arranged a two year charter for the fast catamaran HMAS *Jervis Bay* (II) to provide additional troop lift. The amphibious force has since made significant progress and provided support to ADF operations throughout the region and further afield, including Bougainville, the Solomon Islands, Iraq and East Timor.

In the military environment, RAN amphibious ships are designed primarily to conduct combat operations from the sea. The three tasks for which these ships are used are maritime mobility, amphibious operations, and support to operations on land. The defining characteristic of amphibious forces is their cross-environmental mobility and carrying capacity that makes them particularly suited to manoeuvre warfare. The lift capacity, support facilities and presence of RAN amphibious ships can contribute to a range of constabulary and diplomatic tasks, including border protection, peace operations, non-combatant evacuation operations, disaster relief and defence assistance to the civil community. In periods of tension, prepositioning of a maritime force can be a prudent contingency, providing a gesture of support towards allies

or a potential threat to adversaries. Such presence sends a clear message that Australia will protect its interests wherever those interests might lie, and with force if necessary. The capacity to provide sustained forward presence is a powerful diplomatic tool, while the ability to manoeuvre freely at sea can be used to escalate or defuse tensions. A properly constituted amphibious component broadens the potential scope of a maritime force, allowing evacuation or intervention operations to be mounted. It is this ability to poise close to potential trouble spots and react quickly, en masse, which makes an amphibious force more flexible than a mere sealift force. If prepositioned, it is the fastest acting intervention force available to the government. It is certainly quicker than airlifting forces from distant mainland bases and does away with the difficulty of arranging a forward operating base. Properly constituted, an amphibious force carries sufficient combat weight to influence events ashore by either acting alone or by forming the nucleus of a heavier force.



*Today's amphibious ships, Kanimbla and Manoora (RAN)*

Perceptions of what constitutes an amphibious landing tend to be polarised. At one extreme they are seen as suitable only for entirely benign circumstances while at the opposite they conjure images of murderous assaults on strongly defended beaches. Both extremes largely miss the point. The former represents a sea transport capability that could theoretically be allocated to auxiliary forces or civilian contractors. The latter reflects a form of positional warfare and attrition, which is the antithesis of the manoeuvre capability inherent in amphibious forces.

Being numerically small, Australia's technologically advanced forces are better suited to manoeuvre rather than attrition. However in our geographic situation the scope for manoeuvre in the land environment is generally limited. Hence our situation favours joint manoeuvre, exploiting the sea by using amphibious operations to bypass and dislocate enemy forces. The concept of manoeuvre warfare is, in its simplest form, to employ movement to apply one's own strength against enemy weakness while avoiding the reverse. This is not a new concept, as more than 2000 years ago the Chinese military philosopher Sun Tzu espoused using the 'indirect

approach' to strike at an enemy's key vulnerabilities.<sup>2</sup> Clearly, the practice of bypassing and isolating enemy strong points is much easier when you can control the sea, while denying it to an adversary.

Equally, by simply remaining at sea even a modest landing force is capable of pinning down an opposing force many times its own strength. In the complex and difficult terrain that exists in the region, land formations may be constrained by the lack of roads, thereby taking additional time to move into their combat positions. An amphibious force can move 250nm a day and choose where, when and whether to land. This concept is known as Operational Manoeuvre from the Sea (OMFTS).

Once committed to a landing, the critical factor is putting forces ashore quickly enough to stay ahead of the adversary's reaction cycle. Consequently, the parameters by which amphibious capability can be measured include not only how much land combat power it can deliver, but also how fast and in what conditions it can be delivered. The agility of an amphibious force depends on specialist equipment including purpose-built amphibious assault ships, landing craft, helicopters and amphibious vehicles. The aim is to get the right amount of force onto the objective without necessarily establishing beachheads, supply dumps, or defensive fire bases. This concept is known as Ship to Objective Manoeuvre (STOM).

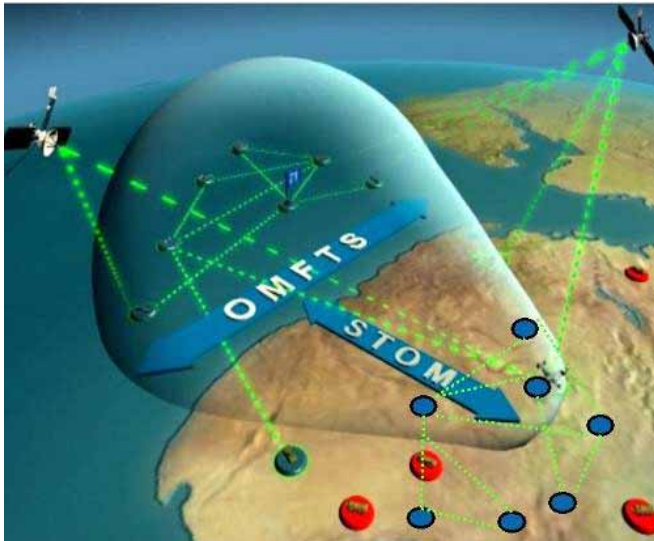


Diagram of the OMFTS and STOM concepts (USMC)

The RAN currently operates two LPAs, one LSH, six LCHs as well as numerous smaller landing craft. The amphibious ships, *Kanimbla* and *Manoora* have been modified extensively for ADF purposes. They have gained cranes, landing craft, helicopter facilities and greatly improved command and control as well as medical facilities. Up to four army Blackhawk helicopters or three RAN Sea King helicopters can be carried in each ship's hangar. Two army landing craft (LCM-8) can be carried on the forward flight deck and launched using the 70 tonne crane. Ship self-protection includes a Phalanx Close In Weapon System (CIWS), stabilised 25mm deck guns, .50 cal machine guns and a SRBOC chaff launcher. The ships have a top speed of 20 knots. They are capable of carrying 450 troops together with their vehicles and equipment. The stern door provides access to 810 square

metres of storage space on the vehicle deck, including 229 lane metres of vehicles.

The LSH, *Tobruk*, is a modification of the British *Sir Bedivere* class amphibious logistic ship. *Tobruk* is a multi-purpose troop and vehicle carrier, with facilities for bow and stern loading, a drive-through capacity, and inter-deck transfer ramps. The ship can beach and land tanks and other heavy equipment provided the beach and weather conditions are suitable. Her self-defence capability includes 25mm and .50 cal guns. In terms of cargo capacity, she can carry 1300 tonnes or 330 lane metres of vehicles. This equates to 18 tanks, 24 trucks or 16 shipping containers carried in the tank deck as well as 5 tanks, 40 armoured personnel carriers, or 29 containers on the vehicle deck. The vehicle deck has been strengthened to carry two LCM-8s as deck cargo, which can then be launched using the derrick. In addition, two smaller landing craft (LCVP) can be placed on davits. These can carry one Land Rover size vehicle or 36 personnel. *Tobruk's* troop capacity is 315 for extended duration or up to 520 for short periods. The ship has a top speed of about 16 knots. Although lacking a hangar, *Tobruk* can also embark up to two Sea King helicopters.

The six LCH are capable of undertaking oceanic passage in moderate sea states. They are versatile craft able to move and supply personnel in areas that other vehicles cannot reach. For instance, they provided much of the logistics backbone during the ADF's recent deployments to the Solomon Islands. The LCH can mate their bow ramp to the stern ramps of the larger amphibious ships, allowing for vehicles and equipment to be transferred between units. The maximum cargo load of the LCH is governed by the load-fuel balance. A load of 175 tonnes gives the ship a maximum range of 1300nm increasing to 2280nm for a load of 150 tonnes. They can carry up to two tanks, 23 trucks or 13 armoured personnel carriers. In ship-to-shore operations, 400 fully equipped troops can be carried, but only 60 for calm weather coastal passages. Top speed is approximately 9 knots.

By 2030 the RAN will be operating a fully integrated amphibious force specifically designed and constructed to meet stringent ADF operational and environmental requirements. The future amphibious manoeuvre force will consist of two landing helicopter dock (LHD) amphibious ships (to be named *Canberra* and *Adelaide*), a strategic sealift ship and six intra-theatre landing craft.<sup>3</sup> When combined with army and air force elements, the future ADF will have a considerable ability to use maritime manoeuvre to help maintain global maritime security and to influence events across the Indo-Pacific region.

1 BH Liddell Hart, *Deterrence or Defence*, Stevens & Sons, London, 1960, pp. 127-8.

2 Sun Tzu, *The Art of War*, translated by Thomas Cleary, Shambhala Publications, Boston, 1991, esp. Section 4 Formation. Online at <[www.generationterrorists.com/quotes/bingfa.html](http://www.generationterrorists.com/quotes/bingfa.html)> (20 June 2009).

3 Department of Defence, *Defending Australia in the Asia Pacific Century: Force 2030*, Canberra, 2009, p. 73.

